



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/593,343	09/19/2006	Mitsunori Ito	296642US0PCT	8946
22850	7590	06/25/2009		
OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			EXAMINER ROY, SIKHA	
			ART UNIT 2879	PAPER NUMBER
			NOTIFICATION DATE 06/25/2009	DELIVERY MODE ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocket@oblon.com

oblonpat@oblon.com

jgardner@oblon.com

### Office Action Summary

**Application No.**

10/593,343

**Applicant(s)**

ITO ET AL.

**Examiner**

Sikha Roy

**Art Unit**

2879

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 19 September 2006.  
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.  
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-10 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.  
6) ☒ Claim(s) 1-10 is/are rejected.  
7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.  
8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.  
10) ☒ The drawing(s) filed on 19 September 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☒ All b) ☐ Some \* c) ☐ None of:  
1. ☒ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)  
2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)  
3) ☒ Information Disclosure Statement(s) (PTO-8508)  
Paper No(s)/Mail Date 0906.0508  
4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_  
5) ☐ Notice of Informal Patent Application  
6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Priority***

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

### ***Specification***

The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1,2, 4-6 and 10 are rejected under 35 U.S.C. 102(b) as being anticipated by JP 2003264086 to Kajitani et al. (of record).

Regarding claim 1 Kajitani discloses (Fig. 2 para [0095]-[0110]) an organic EL device comprising at least one anode 2, an organic emitting layer and a cathode 9 stacked in this order, where a first emitting layer 5 comprising a fluorescent dopant and

a second emitting layer 6 comprising a phosphorescent dopant being stacked in the organic emitting layer.

Regarding claim 2 Kajitani discloses the first light emitting layer 5 is closer to the anode than the second light emitting layer.

Regarding claim 4 Kajitani discloses (para [0095]-[0097], [0104]-[0106]) a host of the first emitting layer comprises styryl arylamine derivative as hole transporting or electron transporting material and a host of the second emitting layer comprises oxadiazole derivative as electron transporting or hole transporting compound.

Regarding claims 5 and 6 Kajitani does not explicitly disclose the electron mobility of the electron transporting (claim 5) and hole mobility of the hole transporting compound (claim 6) but the host compound for the electron transporting material (oxadiazole derivative) and host compound for the hole transporting material (styryl derivative) being the same as those disclosed by applicant will inherently have the same electron and hole mobility respectively.

Claim 10 merely claims the intended use of the organic EL device and does not differentiate the claimed display from prior art EL device structurally. Thus the Examiner asserts that organic EL device of Kajitani is capable of being used in a display.

Claims 1 - 4, and 7-10 are rejected under 35 U.S.C. 102(e) as being anticipated by US Pub 2005/0077817 to Yamazaki et al.

Regarding claim 1 Yamazaki discloses (Fig. 1 para [0063]) an organic EL device comprising at least one anode 101, an organic emitting layer and a cathode 102

stacked in this order, where a first emitting layer 113 comprising a fluorescent dopant 123 and a second emitting layer 114 comprising a phosphorescent dopant 124 being stacked in the organic emitting layer.

Regarding claim 2 Yamazaki discloses in Fig. 1 the first emitting layer is closer to the anode than the second emitting layer.

Regarding claim 3 Yamazaki (para [0071]) the first emitting layer with fluorescent dopant is closer to the cathode than the second emitting layer.

Regarding claim 4 Yamazaki discloses (Fig. 1 [0063]) wherein a host 121 of the first emitting layer 111 comprises an electron transporting compound or hole transporting compound, and a host 122 of the second emitting layer 112 comprises an electron transporting compound or hole transporting compound.

Regarding claims 7 and 8 Yamazaki discloses ([0079], [0087]) the first emitting layer emits blue (peak in a region 400nm or more) and the second emitting layer emits red light.

Regarding claim 9 Yamazaki discloses ([0078]) the organic EL device emits white light.

Regarding claim 10 Yamazaki discloses (figs. 7,8) the organic EL device is used in a display.

#### ***Contact Information***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sikha Roy whose telephone number is (571) 272-2463. The examiner can normally be reached on Monday-Friday 8:00 a.m. – 4:30 p.m.

Art Unit: 2879

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nimeshkumar D. Patel can be reached on (571) 272-2457. The fax phone number for the organization is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Sikha Roy/

Primary Examiner, Art Unit 2879